TABLE 15
STATEMENT OF FIDUCIARY NET POSITION

		June 30, 2021
1. Assets		
a. Cash		\$ 1,593,714
b. Receiv	rables	
i.	Contributions and Miscellaneous Receivables	\$ 3,934,453
ii.	Investments Receivable	125,722,300
iii.	Foreign Exchange Contracts Receivable	2,880,258,582
iv.	Interest and Dividends	33,624,433
v.	Receivables Due From Other Funds	1,933,231
vi.	Total Receivables	\$ 3,045,472,999
c. Investr	ments	
i.	Short-Term Investments	\$ 0
ii.	Pooled Repurchase Agreements	143,390,809
iii.	Pooled Short-Term Investments	1,007,396,594
iv.	Pooled Fixed Income	4,943,621,732
v.	Pooled Equity	3,452,678,491
vi.	Pooled Alternative Investments	7,452,540,782
vii.	Pooled Derivatives	43,784,433
viii.	Pooled Investments	0
ix.	Securities Lending Collateral	83,910,169
х.	Total Investments	\$ 17,127,323,010
d. Net Ca	apital Assets	4,472,803
e. Other	Assets	321,206
f. Total A	Assets: $a + b(vi) + c(x) + d + e$	\$ 20,179,183,732
2. Liabilitie	es	
a. Admin	istrative Payable	\$ 8,454,981
	ment Benefits Payable	874,071
c. Investr	ments Payable	784,065,060
d. Foreig	n Exchange Contracts Payable	2,859,270,557
_	ties Lending Obligations	83,910,169
	ies Sold Under Agreement to Repurchase	195,299,135
	o Other Funds	0
_	Other Governments	0
i. Total L	iabilities: $a + b + c + d + e + f + g + h$	\$ 3,931,873,973
3. Fiduciar	y Net Position Restricted for Pensions: (1)(f) - (2)(i)	\$ 16,247,309,759



TABLE 16
STATEMENT OF CHANGES IN FIDUCIARY NET POSITION

	For Fiscal Year Ending June 30, 202
1. Fiduciary Net Position as of June 30, 2020	\$ 13,261,359,96
2. Additions	
a. Contributions	
i. Member Contributions	\$
ii. Employer Contributions	626,986,45
iii. Service Purchases (Employer and Member) ¹	458,61
iv. Non-Employer Contributing Entity Contributions	
v. Total Contributions	\$ 627,445,07
b. Investment Income/(Loss)	
i. Net Appreciation/(Depreciation)	\$ 3,254,939,42
ii. Net Interest and Dividend Income	180,899,00
iii. Securities Lending Income	877,47
iv. Other Net Investment Income	922,80
v. Investment Management Expenses	(105,915,135
vi. Direct Investment Expenses	(5,991,908
vii. Securities Lending Expenses	(181,694
viii. Total Investment Income/(Loss)	\$ 3,325,549,96
c. Other Additions	
i. Member Reassignments	5,125,75
ii. Miscellaneous Receipts	122,29
iii. Total Other Additions	\$ 5,248,04
d. Total Revenue (Additions): a(v) + b(viii) + c(iii)	\$ 3,958,243,08
3. Deductions	
a. Pension, Survivor and Disability Benefits	\$ 946,107,17
b. Death and Funeral Benefits	
c. Distributions of Contributions and Interest	
d. Administrative Expenses ²	18,003,36
e. Member Reassignments	8,182,75
f. Miscellaneous Expenses	
g. Total Expenses (Deductions)	\$ 972,293,29
4. Net Increase (Decrease) in Fiduciary Net Position: (2)(d) - (3)(g)	s) \$ 2,985,949,79
	, -,,,

¹ Service purchases paid by employer of \$329,582 and employee of \$129,035.

² Includes \$1,309,380 of hybrid plan contributions and \$330,874 of My Choice plan contributions made by INPRS.



TABLE 17 SCHEDULE OF CHANGES IN NET PENSION LIABILITY

For Fiscal Year Ending June 30, 2021 **Total Pension Plan Fiduciary Net Pension Net Position** Liability Liability **(b)** (a) - (b)(a) \$ \$ 1. Balance at June 30, 2020 16,281,754,235 13,261,359,961 3,020,394,274 2. Changes for the Year: Service Cost (SC)¹ 206,224,841 206,224,841 Interest Cost 1,080,919,775 1,080,919,775 Experience (Gains)/Losses 30,428,538 30,428,538 **Assumption Changes** 896,589,242 896,589,242 Plan Amendments 15,946,383 15,946,383 Benefit Payments (946, 107, 172)(946, 107, 172)Service Purchases 329,582 0 **Employer Contributions** 329,582 **Employee Contributions** 129,035 129,035 0 Member Reassignments² (3,056,997)(3,056,997)Employer Contributions ³ 626,986,459 (626,986,459)0 0 Non-employer Contributions **Employee Contributions** 0 Net Investment Income 3,325,549,968 (3,325,549,968)Administrative Expenses ⁴ (18,003,369)18,003,369 Other 122,292 (122,292)**Net Changes** \$ 1,281,403,227 \$ 2,985,949,798 (1,704,546,571)

17,563,157,462

3. Balance at June 30, 2021

\$

16,247,309,759

1,315,847,703

¹ Service cost provided as of beginning of year. Interest to end of year is included in the interest cost.

² Includes net interfund transfers of employer contributed amounts.

³ Includes \$23,000,000 of state appropriations to the fund.

⁴ Includes contributions made by INPRS for its employees of \$1,309,380 in the hybrid plan and \$330,874 in the My Choice plan.



TABLE 18

DEFERRED OUTFLOWS OF RESOURCES

		June 30, 2020	Remaining Period	Recognition	June 30, 2021
1. Liability Experience					
June 30, 2021 Loss	\$	30,428,538	3.82	\$ 7,965,586	\$ 22,462,952
June 30, 2020 Loss		0	2.84	0	0
June 30, 2019 Loss		48,755,428	1.86	26,212,596	22,542,832
June 30, 2018 Loss		4,757,286	0.93	4,757,286	0
June 30, 2017 Loss		0	0.00	0	0
June 30, 2016 Loss		0	0.00	0	0
June 30, 2015 Loss		0	0.00	0	0
June 30, 2014 Loss		0	0.00	0	0
2. Assumption Changes					
June 30, 2021 Loss	\$	896,589,242	3.82	\$ 234,709,226	\$ 661,880,016
June 30, 2020 Loss		0	2.84	0	0
June 30, 2019 Loss		0	1.86	0	0
June 30, 2018 Loss		0	0.93	0	0
June 30, 2017 Loss		0	0.00	0	0
June 30, 2016 Loss		0	0.00	0	0
June 30, 2015 Loss		0	0.00	0	0
3. Investment Experience	;				
June 30, 2021 Loss	\$	0	5.00	\$ 0	\$ 0
June 30, 2020 Loss		439,213,683	4.00	109,803,421	329,410,262
June 30, 2019 Loss		0	3.00	0	0
June 30, 2018 Loss		0	2.00	0	0
June 30, 2017 Loss		0	1.00	 0	 0
Total Outflows:					
(1)+(2)+(3)	\$	1,419,744,177		\$ 383,448,115	\$ 1,036,296,062

Information was provided prospectively from June 30, 2013 for GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.

In accordance with GASB, the original amortization period for liability experience and assumption changes are amortized over the expected future working lifetime of all members, whereas the investment experience is amortized over five years.



TABLE 19
DEFERRED INFLOWS OF RESOURCES

	Remaining June 30, 2020 Period				Recognition	June 30, 2021	
4.74.184. 75	•	June 30, 2020	1 er iou		Recognition	•	June 30, 2021
1. Liability Experience							
June 30, 2021 Gain	\$	0	3.82	\$	0	\$	0
June 30, 2020 Gain		40,552,683	2.84		14,279,114		26,273,569
June 30, 2019 Gain		0	1.86		0		0
June 30, 2018 Gain		0	0.93		0		0
June 30, 2017 Gain		0	0.00		0		0
June 30, 2016 Gain		0	0.00		0		0
June 30, 2015 Gain		0	0.00		0		0
June 30, 2014 Gain		0	0.00		0		0
2. Assumption Changes							
June 30, 2021 Gain	\$	0	3.82	\$	0	\$	0
June 30, 2020 Gain		456,197,035	2.84		160,632,760		295,564,275
June 30, 2019 Gain		0	1.86		0		0
June 30, 2018 Gain		173,126,885	0.93		173,126,885		0
June 30, 2017 Gain		0	0.00		0		0
June 30, 2016 Gain		0	0.00		0		0
June 30, 2015 Gain		0	0.00		0		0
3. Investment Experience	,						
June 30, 2021 Gain	\$	2,441,869,676	5.00	\$	488,373,936	\$	1,953,495,740
June 30, 2020 Gain		0	4.00		0		0
June 30, 2019 Gain		36,389,342	3.00		12,129,782		24,259,560
June 30, 2018 Gain		120,325,903	2.00		60,162,953		60,162,950
June 30, 2017 Gain		24,001,487	1.00		24,001,487		0
Total Inflows:						_	
(1)+(2)+(3)	\$	3,292,463,011		\$	932,706,917	\$	2,359,756,094

Information was provided prospectively from June 30, 2013 for GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.

In accordance with GASB, the original amortization period for liability experience and assumption changes are amortized over the expected future working lifetime of all members, whereas the investment experience is amortized over five years.



TABLE 20
DEFERRED INFLOWS / OUTFLOWS TO BE RECOGNIZED IN PENSION EXPENSE

Fiscal Year Ending June 30	Def	Deferred Outflows		ferred Inflows	Net Deferred Outflows/(Inflows)	
Current Year:						
2021	\$	383,448,115	\$	932,706,917	\$	(549,258,802)
Future Years:						
2022	\$	375,021,065	\$	735,578,542	\$	(360,557,477)
2023		352,478,233		647,429,684		(294,951,451)
2024		308,796,764		488,373,936		(179,577,172)
2025		0		488,373,932		(488, 373, 932)
2026		0		0		0
Thereafter		0		0		0



TABLE 21

PENSION EXPENSE UNDER GASB NO. 68

	For Fiscal Year E	ndin	g June 30, 2021
1. Service Cost, beginning of year		\$	206,224,841
2. Interest Cost, including interest on service cost			1,080,919,775
3. Member Contributions ¹			0
4. Administrative Expenses ²			16,363,115
5. Expected Return on Assets ³			(883,680,292)
6. Plan Amendments			15,946,383
7. Recognition of Deferred Inflows / Outflows of Resources Related to: a. Liability Experience (Gains) / Losses b. Assumption Change (Gains) / Losses c. Investment Experience (Gains) / Losses d. Total: (7a)+(7b)+(7c)	24,656,354 (99,050,419) (474,864,737)		(549,258,802)
8. Miscellaneous (Income) / Expense			(122,292)
9. Total Collective Pension Expense: (1)+(2)+(3)+(4)+(5)+(6)+(7d)+(8) 10. Employer Service Purchases ⁴			(113,607,272) 329,582
Pension Expense / (Income): (9) + (10)		\$	(113,277,690)

¹ Excludes member paid service purchases of \$129,035.

² Excludes contributions made by INPRS for its employees of \$1,309,380 in the hybrid plan and \$330,874 in the My Choice plan.

³ Cash flows assumed to occur mid-year.

⁴ To be expensed by the employers who purchased the service.



GASB NO. 67 and GASB NO. 68 NOTES TO THE FINANCIAL STATEMENTS

The material presented herein is a subset of the information requested as Notes to the Financial Statements. Required information not provided herein is to be supplied by the plan.

Actuarial Assumptions and Inputs

Significant actuarial assumptions and other inputs used to measure the total pension liability:

Type of Plan

The Public Employees' Retirement Fund is a cost-sharing multiple-

employer plan for GASB accounting purposes.

Measurement Date June 30, 2021

Valuation Date

Assets: June 30, 2021

Liabilities: June 30, 2020 – The TPL as of June 30, 2021 was determined based on an

actuarial valuation prepared as of June 30, 2020 rolled forward one year to June 30, 2021, using the following key actuarial assumptions and other inputs, such as benefit accruals and actual benefit payments during that

time period.

Inflation 2.00%

Future Salary Increases 2.65% - 8.65% based on service

Cost-of-Living Increases As of June 30, 2021:

Members in pay were granted a 1.00% COLA on January 1, 2022 and no COLA on January 1, 2023. Thereafter, the following COLAs, compounded

annually, were assumed:

0.4% beginning on January 1, 2024 0.5% beginning on January 1, 2034 0.6% beginning on January 1, 2039

As of June 30, 2020:

In lieu of a COLA on January 1, 2021, members in pay were provided a 13th check on October 1, 2020. Thereafter, the following COLAs,

compounded annually, were assumed: 0.4% beginning on January 1, 2022 0.5% beginning on January 1, 2034

0.6% beginning on January 1, 2039



Mortality Assumption Pub-2010 Public Retirement Plans Mortality Tables (Amount-Weighted) with a fully generational projection of mortality improvements using SOA Scale MP-2019.

Healthy Employees – General Employee table with a 3 year set forward for males and a 1 year set forward for females.

Retirees – General Retiree table with a 3 year set forward for males and a 1 year set forward for females.

Beneficiaries – Contingent Survivor table with no set forward for males and a 2 year set forward for females.

Disableds – General Disabled table with a 140% load.

Experience Study

The most recent comprehensive experience study, based on member experience between June 30, 2014 and June 30, 2019, was completed in February 2020. The demographic assumptions were approved by the Board in June 2020 and were used beginning with the June 30, 2020 actuarial valuation. Economic assumptions were updated and approved by the Board in May 2021 following the completion of an Asset-Liability study and first used in the June 30, 2021 actuarial valuation.

Discount Rate

6.25%, net of investment expenses

The discount rate is equal to the expected long-term rate of return on plan investments, net of investment expense and including price inflation. The discount rate decreased from the 6.75% used on the prior measurement date.

The INPRS Board of Trustees has established a funding policy of setting the employer contribution rate equal to the greater of 11.2% (the current contribution rate) or a rate equal to the actuarially determined contribution rate, which is based on the assumptions and methods selected by the Board for the annual actuarial valuations and projected covered member payroll. The June 30, 2021 actuarial valuation assumes a long-term rate of return on assets of 6.25%, a 20-year level dollar closed method for amortizing the future layers of unfunded actuarial accrued liability (30 years for amortization layers established prior to June 30, 2016), and a 5-year smoothing method for recognizing investment gains and losses in the actuarial value of assets.

In the past several years, the Board has followed its current funding policy and the State has complied in its contributions to the plan. Therefore, if past practice is continued, the appropriations will be sufficient to fully fund the plan within 20 to 30 years. Deterministic projections indicate the actuarially determined contribution rate will decline over the coming years. As a result, it is presumed that the projected plan assets will be sufficient to cover the future benefit payments for current members and a detailed projection of plan assets and cash flows has not been prepared.



Discount Rate Sensitivity

	1% Decrease 5.25%	Current Rate 6.25%	1% Increase 7.25%
Net Pension Liability	\$3,441,518,642	\$1,315,847,703	(\$457,243,192)

Classes of Plan Members Covered

The June 30, 2021 valuation was performed using census data provided by INPRS as of June 30, 2020. Standard actuarial techniques were used to roll forward the total pension liability computed as of June 30, 2020 to the June 30, 2021 measurement date using actual benefit payments during that period of time.

Number as of June 30, 2020				
1. Currently Receiving Benefits:				
Retired Members, Disabled Members, and Beneficiaries	94,851			
2. Inactive Members Entitled To But Not Yet Receiving Benefits	33,931			
3. Inactive Non-vested Members Entitled to a Refund of Member Contributions	0			
4. Active Members	125,386			
Total Covered Plan Members: (1)+(2)+(3)+(4)	254,168			

Money-Weighted Rate of Return

The money-weighted rate of return equals investment performance, net of pension plan investment expense, adjusted for the changing amounts actually invested. For the fiscal year ending June 30, 2021, the money-weighted return on the plan assets is 25.5%.

Components of Net Pension Liability

As of June 30, 2021					
Total Pension Liability	\$	17,563,157,462			
Fiduciary Net Position	φ 	16,247,309,759			
Net Pension Liability	\$	1,315,847,703			
Ratio of Fiduciary Net Position to Total Pension Liability		92.51%			



GASB NO. 67 AND GASB NO. 68: REQUIRED SUPPLEMENTAL INFORMATION SCHEDULE OF CHANGES IN THE TOTAL PENSION LIABILITY AND PLAN FIDUCIARY NET POSITION

Fiscal Year Ending June 30	2017	2018	2019	2020	2021
Total Pension Liability					
Total Pension Liability - beginning	\$18,408,946,980	\$19,106,214,994	\$16,091,372,940	\$16,576,060,167	\$16,281,754,235
DC Account Balances - beginning 1	2,656,892,220	2,770,961,812	0	0	0
DB Pension Liability - beginning	\$15,752,054,760	\$16,335,253,182	\$16,091,372,940	\$16,576,060,167	\$16,281,754,235
Service Cost (SC), beginning-of-year	194,101,310	202,323,634	195,382,841	201,143,591	206,224,841
Interest Cost, including interest on SC	1,051,217,483	1,088,503,109	1,069,184,188	1,101,241,510	1,080,919,775
Experience (Gains)/Losses	82,963,628	20,103,378	101,180,620	(54,831,797)	30,428,538
Assumption Changes	22,809,173	(731,600,714)	0	(616,829,795)	896,589,242
Plan Amendments	(22,765,723)	Ó	12,919,637	Ó	15,946,383
DC Annuitizations	78,792,615	43,873,966	0	0	0
Actual Benefit Payments	(820,721,414)	(860,613,831)	(888,510,777)	(922,190,241)	(946,107,172)
Member Reassignments	(3,617,572)	(7,030,159)	(5,787,037)	(3,163,150)	(3,056,997)
Service Purchases	418,922	560,375	317,755	323,950	458,617
Net Change in Total Pension Liability	583,198,422	(243,880,242)	484,687,227	(294,305,932)	1,281,403,227
DB Pension Liability - ending	\$16,335,253,182	\$16,091,372,940	\$16,576,060,167	\$16,281,754,235	\$17,563,157,462
DC Account Balances - ending 1	2,770,961,812	0	0	0	0
(a) Total Pension Liability - ending	\$19,106,214,994	\$16,091,372,940	\$16,576,060,167	\$16,281,754,235	\$17,563,157,462
Plan Fiduciary Net Position					
Plan Fiduciary Net Position – beginning	\$13,870,502,444	\$14,644,671,525	\$12,694,327,690	\$13,270,996,471	\$13,261,359,961
DC Account Balances - beginning ¹	2,656,892,220	2,770,961,812	0	0	0
DB Plan Fiduciary Net Position – beginning	\$11,213,610,224	\$11,873,709,713	\$12,694,327,690	\$13,270,996,471	\$13,261,359,961
Contributions – employer	558,892,767	571,373,825	581,873,684	599,100,479	627,316,041
Contributions – non-employer	0	0	0	0	027,510,011
Contributions – member	589,663	708,034	294,752	126,815	129,035
Net investment income	870,591,483	1,093,094,099	906,388,001	335,138,985	3,325,549,968
Actual benefit payments	(820,721,414)	(860,613,831)	(888,510,777)	(922,190,241)	(946,107,172)
Net member reassignments	(3,617,572)	(7,030,159)	(5,787,037)	(3,163,150)	(3,056,997)
DC Annuitizations	78,792,615	43,873,966	0	0	0
Administrative expense	(24,483,053)	(20,844,003)	(18,471,916)	(18,886,120)	(18,003,369)
Other	55,000	56,046	882,074	236,722	122,292
Net change in Plan Fiduciary Net Position	660,099,489	820,617,977	576,668,781	(9,636,510)	2,985,949,798
DB Plan Fiduciary Net Position – ending	\$11,873,709,713	\$12,694,327,690	\$13,270,996,471	\$13,261,359,961	\$16,247,309,759
DC Account Balances - ending 1	2,770,961,812	0	0	0	0
(b) Plan Fiduciary Net Position - ending	\$14,644,671,525	\$12,694,327,690	\$13,270,996,471	\$13,261,359,961	\$16,247,309,759
Net Pension Liability - ending, (a) - (b)	\$4,461,543,469	\$3,397,045,250	\$3,305,063,696	\$3,020,394,274	\$1,315,847,703

¹ Effective January 1, 2018, DC account balances are handled by a third party annuity provider and are treated as a separate defined contribution plan. Information was provided prospectively from June 30, 2013 for GASB No. 67 and GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.



GASB NO. 67 AND GASB NO. 68: REQUIRED SUPPLEMENTAL INFORMATION SCHEDULE OF CHANGES IN THE TOTAL PENSION LIABILITY AND PLAN FIDUCIARY NET POSITION (continued)

Fiscal Year Ending June 30	2013	2014	2015	2016
Total Pension Liability				
Total Pension Liability - beginning	\$15,784,239,911	\$16,145,680,789	\$16,732,222,649	\$17,980,568,263
DC Account Balances - beginning ¹	2,749,448,762	2,796,102,616	2,851,500,608	2,717,173,311
DB Pension Liability - beginning	\$13,034,791,149	\$13,349,578,173	\$13,880,722,041	\$15,263,394,952
Service Cost (SC), beginning-of-year	270,973,983	258,069,653	273,909,865	191,055,506
Interest Cost, including interest on SC	875,615,527	895,453,921	936,403,574	1,018,992,903
Experience (Gains)/Losses	(104,470,833)	(15,161,517)	247,977,703	(4,869,991)
Assumption Changes	0	0	488,354,517	0
Plan Amendments	(167,485,633)	(42,984,699)	0	0
DC Annuitizations	107,520,485	119,094,145	196,788,238	75,035,755
Actual Benefit Payments	(662,283,487)	(680,203,104)	(752,895,719)	(786,606,562)
Member Reassignments	(5,083,018)	(3,124,531)	(8,155,200)	(5,441,493)
Service Purchases	0	0	289,933	493,690
Net Change in Total Pension Liability	314,787,024	531,143,868	1,382,672,911	488,659,808
DB Pension Liability - ending	\$13,349,578,173	\$13,880,722,041	\$15,263,394,952	\$15,752,054,760
DC Account Balances - ending 1	2,796,102,616	2,851,500,608	2,717,173,311	2,656,892,220
(a) Total Pension Liability - ending	\$16,145,680,789	\$16,732,222,649	\$17,980,568,263	\$18,408,946,980
Plan Fiduciary Net Position				
Plan Fiduciary Net Position – beginning	\$12,243,753,114	\$12,720,601,718	\$14,104,287,554	\$13,907,666,213
DC Account Balances - beginning ¹	2,749,448,762	2,796,102,616	2,851,500,608	2,717,173,311
DB Plan Fiduciary Net Position – beginning	\$9,494,304,352	\$9,924,499,102	\$11,252,786,946	\$11,190,492,902
Contributions – employer	455,658,474	526,089,688	538,059,283	615,773,383
Contributions – non-employer	0	0	0	0
Contributions – member	0	0	0	442,809
Net investment income	563,532,572	1,393,813,042	(10,667,128)	147,106,621
Actual benefit payments	(662,283,487)	(680,203,104)	(752,895,719)	(786,606,562)
Net member reassignments	(5,083,018)	(3,124,531)	(8,155,200)	(5,441,493)
DC Annuitizations	107,520,485	119,094,145	196,788,238	75,035,755
Administrative expense	(29,181,276)	(27,433,396)	(25,506,518)	(24,098,191)
Other	31,000	52,000	83,000	905,000
Net change in Plan Fiduciary Net Position	430,194,750	1,328,287,844	(62,294,044)	23,117,322
DB Plan Fiduciary Net Position – ending	\$9,924,499,102	\$11,252,786,946	\$11,190,492,902	\$11,213,610,224
DC Account Balances - ending ¹	2,796,102,616	2,851,500,608	2,717,173,311	2,656,892,220
(b) Plan Fiduciary Net Position - ending	\$12,720,601,718	\$14,104,287,554	\$13,907,666,213	\$13,870,502,444
Net Pension Liability - ending, (a) - (b)	\$3,425,079,071	\$2,627,935,095	\$4,072,902,050	\$4,538,444,536

¹ Effective January 1, 2018, DC account balances are handled by a third party annuity provider and are treated as a separate defined contribution plan. Information was provided prospectively from June 30, 2013 for GASB No. 67 and GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.



GASB NO. 67 AND GASB NO. 68: REQUIRED SUPPLEMENTAL INFORMATION

SCHEDULE OF THE NET PENSION LIABILITY

Fiscal Year Ending June 30	2017	2018	2019	2020	2021
Total Pension Liability	\$19,106,214,994	\$16,091,372,940	\$16,576,060,167	\$16,281,754,235	\$17,563,157,462
Plan Fiduciary Net Position	14,644,671,525	12,694,327,690	13,270,996,471	13,261,359,961	16,247,309,759
Net Pension Liability	\$4,461,543,469	\$3,397,045,250	\$3,305,063,696	\$3,020,394,274	\$1,315,847,703
Ratio of Plan Fiduciary Net Position to Total Pension Liability	76.65%	78.89%	80.06%	81.45%	92.51%
Covered-employee payroll ¹	\$4,997,555,495	\$5,083,130,815	\$5,205,242,704	\$5,380,842,933	\$5,482,242,349
Net Pension Liability as a percentage of covered- employee payroll	89.27%	66.83%	63.49%	56.13%	24.00%
Fiscal Year Ending June 30		2013	2014	2015	2016
Total Pension Liability		\$16,145,680,789	\$16,732,222,649	\$17,980,568,263	\$18,408,946,980
Plan Fiduciary Net Position		12,720,601,718	14,104,287,554	13,907,666,213	13,870,502,444
Net Pension Liability		\$3,425,079,071	\$2,627,935,095	\$4,072,902,050	\$4,538,444,536
Ratio of Plan Fiduciary Net Position to Total Pension Liability		78.79%	84.29%	77.35%	75.35%
Covered-employee payroll ¹		\$4,700,000,000	\$4,896,635,240	\$4,804,145,033	\$4,868,709,366
Net Pension Liability as a percentage of covered- employee payroll		72.87%	53.67%	84.78%	93.22%

¹ As provided by INPRS.

Information was provided prospectively from June 30, 2013 for GASB No. 67 and GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.



GASB NO. 67 AND GASB NO. 68: REQUIRED SUPPLEMENTAL INFORMATION

SCHEDULE OF EMPLOYER CONTRIBUTIONS

Fiscal Year Ending June 30	2017	2018	2019	2020	2021
Actuarially Determined Contribution 1	\$496,867,070	\$502,205,573	\$527,836,147	\$482,316,183	\$452,332,617
Actual employer contributions ² Annual contribution (deficiency) / excess	\$558,660,887 \$61,793,817	\$571,098,939 \$68,893,366	\$581,850,681 \$54,014,534	\$598,903,344 \$116,587,161	\$626,986,459 \$174,653,842
Covered-employee payroll ³ Actual contributions as a percentage of covered-employee payroll	\$4,997,555,495 11.18%	\$5,083,130,815 11.24%	\$5,205,242,704 11.18%	\$5,380,842,933 11.13%	\$5,482,242,349 11.44%
Fiscal Year Ending June 30		2013	2014	2015	2016
Fiscal Year Ending June 30 Actuarially Determined Contribution ¹ Actual employer contributions ² Annual contribution (deficiency) / excess		\$464,046,667 \$455,658,474 (\$8,388,193)	\$528,562,365 \$519,575,670 (\$8,986,695)	\$517,716,612 \$536,202,332 \$18,485,720	\$491,999,602 \$547,684,477 \$55,684,875

¹ The State and Political Subdivision employer rates were applied to the actual covered employee payroll for the fiscal year to determine the contribution amount. The surcharge rate used for both State and Political Subdivision uses the valuation completed two years ago for July-December and one year ago for January-June. State - The actuarially determined amortization and normal cost rates were developed in the actuarial report completed one year prior to the fiscal year. Political Subdivisions - The rate is determined as the average of these two rates:

Information was provided prospectively from June 30, 2013 for GASB No. 67 and GASB No. 68 purposes. Results prior to 2018 were produced by the prior actuary.

a. Actuarially determined amortization and normal cost rates for January-June were developed in the actuarial report completed one year prior to the fiscal year.

b. Actuarially determined amortization and normal cost rates for July-December were developed in the actuarial report completed two years prior to the fiscal year.

² Excludes service purchases paid for by the employer of \$329,582.

³ As provided by INPRS.



GASB NO. 67 AND GASB NO. 68: REQUIRED SUPPLEMENTAL INFORMATION SCHEDULE OF MONEY-WEIGHTED RETURNS

For Fiscal Year Ending June 30	Money-Weighted Return
2021	25.5%
2020	2.6%
2019	7.3%
2018	9.3%
2017	7.6%
2016	1.1%
2015	0.3%
2014	12.3%
2013	5.8%

Information was provided prospectively from June 30, 2013 for GASB No. 67 and GASB No. 68 purposes. Returns provided by INPRS.





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MEMBER DATA RECONCILIATION For June 30, 2020 Data used in the June 30, 2021 Valuation

	Active Members	Inactive Vested	Inactive Deceased	Disabled	Retired	Beneficiary	Total
1. As of June 30, 2019	125,780	33,441	134	2,613	79,371	10,452	251,791
2. Data Adjustments							
New Participants	15,426	0	0	0	0	0	15,426
Rehires	472	(471)	0	0	(1)	0	0
Terminations:							
Not Vested	(10,012)	0	0	0	0	0	(10,012)
Deferred Vested	(2,731)	2,731	0	0	0	0	0
Disability	(85)	0	0	85	0	0	0
Retirements	(3,248)	(1,946)	(6)	0	5,194	6	0
Refund / Benefits Ended	0	(204)	(19)	(9)	(1)	(84)	(317)
Transfer	(8)	(190)	0	0	0	0	(198)
Deaths:							
With Beneficiary	(44)	(26)	0	(46)	(777)	893	0
Without Beneficiary	(107)	(67)	0	(58)	(2,215)	(719)	(3,166)
Entitled to Future Benefit	(6)	(2)	8	0	0	0	0
Data Corrections ¹	(51)	548	0	92	10	45	644
Net Change	(394)	373	(17)	64	2,210	141	2,377
3. As of June 30, 2020 ²	125,386	33,814	117	2,677	81,581	10,593	254,168

¹ Data corrections reflect the movement between Disabled and Retired status, along with other movements in the INPRS data.

² Valuation results as of June 30, 2021 were calculated using June 30, 2020 census data, adjusted for certain activity before the valuation date. Headcounts may include multiple records for individuals, such as members with multiple periods of service.



SUMMARY OF MEMBERSHIP DATA

Valuation Date		June 30, 2020		June 30, 2021	% Change
Date of Membership Data ¹		July 1, 2019		July 1, 2020	
ACTIVE MEMBERS					
Number of Active Members ²		125,780		125,386	(0.3%)
Annual Membership Data Salary ³ Anticipated Payroll for Next Fiscal Year	\$ \$	4,994,902,497 5,528,816,114	\$ \$	5,104,883,896 5,627,521,771	2.2% 1.8%
Active Member Averages Age Service Annual Membership Data Salary	\$	47.6 11.2 39,711	\$	47.5 11.1 40,713	(0.2%) (0.9%) 2.5%
INACTIVE MEMBERS					
Number of Inactive Members		33,575		33,931	1.1%
Inactive Member Averages Age Service RETIREES, DISABLEDS, AND BENEFICE	TIA DI	53.7 11.7		53.9 11.6	0.4% (0.9%)
Number of Members	JAKI	ES			
Retired Disabled Beneficiaries Total		79,371 2,613 10,452 92,436		81,581 2,677 10,593 94,851	2.8% 2.4% 1.3% 2.6%
Annual Benefits Retired Disabled Beneficiaries Total	\$	776,149,299 13,262,833 70,014,870 859,427,002	\$	804,897,948 13,875,597 72,394,377 891,167,922	3.7% 4.6% 3.4% 3.7%
Annual Benefits Pension DC Plan Annuities Total	\$	729,882,390 129,544,612 859,427,002	\$	765,032,059 126,135,863 891,167,922	4.8% (2.6%) 3.7%

¹ The valuation results were calculated using the prior year's census data and were adjusted for certain activity during fiscal year, such as new units, enlargements, or withdrawals.

² Data specs provided without data adjustments for activity that occurred during the year.

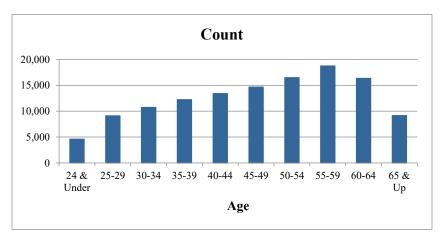
³ Annualized for actives with less than a year of service. Actives with no salary provided are defaulted to the average salary.

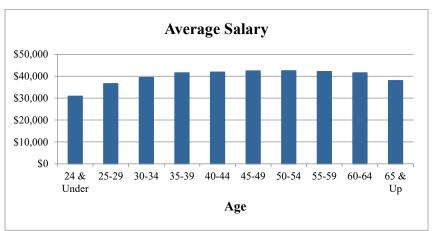


ACTIVE MEMBERS ¹ As of June 30, 2020 for the June 30, 2021 Valuation

Count of Members FY 2020 Annual Membership Data Salary

<u>Age</u>	Male	<u>Female</u>	<u>Total</u>	Male	<u>Female</u>	<u>Total</u>
24 & Under	2,311	2,278	4,589	\$ 79,451,678	\$ 62,330,517	\$ 141,782,195
25-29	4,047	5,058	9,105	160,838,810	172,761,388	333,600,198
30-34	4,484	6,237	10,721	201,691,421	221,105,239	422,796,660
35-39	4,821	7,405	12,226	233,580,949	274,353,560	507,934,509
40-44	4,992	8,409	13,401	250,803,257	310,458,538	561,261,795
45-49	5,473	9,187	14,660	280,398,407	341,736,188	622,134,595
50-54	6,032	10,441	16,473	306,135,525	394,067,502	700,203,027
55-59	7,162	11,564	18,726	357,113,374	431,678,809	788,792,183
60-64	6,219	10,112	16,331	305,086,041	373,391,806	678,477,847
65 & Up	4,168	<u>4,986</u>	<u>9,154</u>	178,850,460	169,050,427	347,900,887
Total	49,709	75,677	125,386	\$ 2,353,949,922	\$ 2,750,933,974	\$ 5,104,883,896





¹ Includes 284 actives who were missing a salary. Their salaries are defaulted to the average salary of \$40,713.



AGE AND SERVICE DISTRIBUTION $^{\rm 1}$ As of June 30, 2020 for the June 30, 2021 Valuation

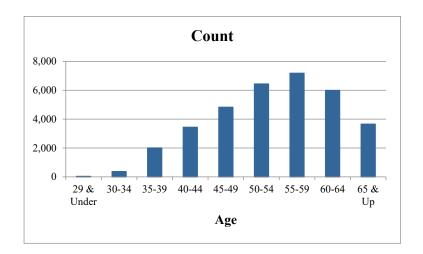
Age		0-4	5-9	10-14	15-19	20-24	25-29	30-34	Over 34	Total
24 &	Number	4,567	22	0	0	0	0	0	0	4,589
Under	Total Salary	\$ 140,755,057	\$ 1,027,138	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 141,782,195
	Average Sal.	\$ 30,820	\$ 46,688	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 30,896
25-29	Number	7,945	1,154	6	0	0	0	0	0	9,105
	Total Salary	\$ 284,402,174	\$ 48,917,556	\$ 280,468	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 333,600,198
	Average Sal.	\$ 35,796	\$ 42,390	\$ 46,745	\$ 0	\$ 0	\$ 0	\$ 0	\$ 0	\$ 36,639
30-34	Number	6,588	3,489	634	10	0	0	0	0	10,721
	Total Salary	\$ 229,900,151	\$ 161,633,462	\$ 30,801,788	\$ 461,259	\$ 0	\$ 0	\$ 0	\$ 0	\$ 422,796,660
	Average Sal.	\$ 34,897	\$ 46,327	\$ 48,583	\$ 46,126	\$ 0	\$ 0	\$ 0	\$ 0	\$ 39,436
35-39	Number	5,669	3,378	2,500	663	16	0	0	0	12,226
	Total Salary	\$ 189,621,294	\$ 153,045,286	\$ 129,865,000	\$ 34,562,411	\$ 840,518	\$ 0	\$ 0	\$ 0	\$ 507,934,509
	Average Sal.	\$ 33,449	\$ 45,306	\$ 51,946	\$ 52,130	\$ 52,532	\$ 0	\$ 0	\$ 0	\$ 41,545
40-44	Number	5,219	3,192	2,333	1,898	746	12	1	0	13,401
	Total Salary	\$ 168,612,011	\$ 132,689,771	\$ 116,586,358	\$ 103,170,120	\$ 39,474,540	\$ 685,166	\$ 43,829	\$ 0	\$ 561,261,795
	Average Sal.	\$ 32,307	\$ 41,569	\$ 49,973	\$ 54,357	\$ 52,915	\$ 57,097	\$ 43,829	\$ 0	\$ 41,882
45-49	Number	4,496	3,232	2,506	2,000	1,824	571	28	3	14,660
	Total Salary	\$ 146,286,194	\$ 126,369,915	\$ 112,426,501	\$ 101,036,045	\$ 102,053,107	\$ 32,297,498	\$ 1,536,098	\$ 129,237	\$ 622,134,595
	Average Sal.	\$ 32,537	\$ 39,100	\$ 44,863	\$ 50,518	\$ 55,950	\$ 56,563	\$ 54,861	\$ 43,079	\$ 42,438
50-54	Number	3,964	3,106	2,777	2,256	1,995	1,600	728	47	16,473
	Total Salary	\$ 130,813,860	\$ 115,589,190	\$ 114,982,487	\$ 104,602,931	\$ 101,093,418	\$ 90,220,428	\$ 40,452,150	\$ 2,448,563	\$ 700,203,027
	Average Sal.	\$ 33,000	\$ 37,215	\$ 41,405	\$ 46,367	\$ 50,673	\$ 56,388	\$ 55,566	\$ 52,097	\$ 42,506
55-59	Number	3,416	2,955	2,847	2,828	2,632	1,731	1,546	771	18,726
	Total Salary	\$ 111,781,931	\$ 111,148,911	\$ 114,341,852	\$ 116,509,795	\$ 117,862,297	\$ 87,968,093	\$ 86,407,257	\$ 42,772,047	\$ 788,792,183
	Average Sal.	\$ 32,723	\$ 37,614	\$ 40,162	\$ 41,199	\$ 44,781	\$ 50,819	\$ 55,891	\$ 55,476	\$ 42,123
60-64	Number	2,360	2,321	2,444	2,372	2,342	1,635	1,261	1,596	16,331
	Total Salary	\$ 72,750,759	\$ 85,705,537	\$ 95,973,573	\$ 96,069,814	\$ 97,748,923	\$ 74,922,337	\$ 65,110,120	\$ 90,196,784	\$ 678,477,847
	Average Sal.	\$ 30,827	\$ 36,926	\$ 39,269	\$ 40,502	\$ 41,737	\$ 45,824	\$ 51,634	\$ 56,514	\$ 41,545
65 &	Number	1,493	1,717	1,564	1,277	1,017	693	613	780	9,154
Up	Total Salary	\$ 37,734,599	\$ 55,296,804	\$ 59,638,999	\$ 49,895,691	\$ 41,773,126	\$ 29,788,783	\$ 28,105,323	\$ 45,667,562	\$ 347,900,887
	Average Sal.	\$ 25,274	\$ 32,205	\$ 38,132	\$ 39,073	\$ 41,075	\$ 42,985	\$ 45,849	\$ 58,548	\$ 38,005
Total	Number	45,717	24,566	17,611	13,304	10,572	6,242	4,177	3,197	125,386
	Total Salary	\$ 1,512,658,030	\$ 991,423,570	\$ 774,897,026	\$ 606,308,066	\$ 500,845,929	\$ 315,882,305	\$ 221,654,777	\$ 181,214,193	\$ 5,104,883,896
	Average Sal.	\$ 33,087	\$ 40,358	\$ 44,001	\$ 45,573	\$ 47,375	\$ 50,606	\$ 53,066	\$ 56,683	\$ 40,713

¹ Includes 284 actives who were missing a salary. Their salaries are defaulted to the average salary of \$40,713.



INACTIVE VESTED MEMBERS As of June 30, 2020 for the June 30, 2021 Valuation

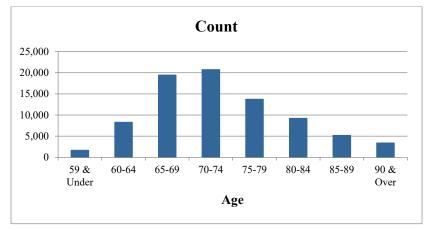
_	Count of Members						
<u>Age</u>	<u>Male</u>	<u>Female</u>	<u>Total</u>				
29 & Under	7	30	37				
30-34	121	249	370				
35-39	663	1,340	2,003				
40-44	1,177	2,263	3,440				
45-49	1,530	3,294	4,824				
50-54	1,976	4,463	6,439				
55-59	2,114	5,063	7,177				
60-64	1,682	4,305	5,987				
65 & Up	<u>1,214</u>	<u>2,440</u>	<u>3,654</u>				
Total	10,484	23,447	33,931				

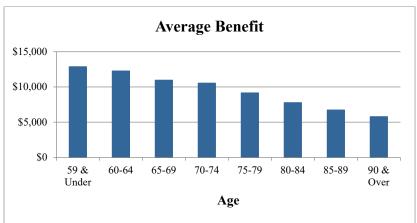




RETIRED MEMBERS As of June 30, 2020 for the June 30, 2021 Valuation

_	Count of Members			Annual Benefits
<u>Age</u>	<u>Male</u>	<u>Female</u>	<u>Total</u>	Male <u>Female</u> <u>Total</u>
59 & Under	768	890	1,658	\$ 11,629,603 \$ 9,692,634 \$ 21,322,237
60-64	3,257	5,027	8,284	48,739,933 52,735,691 101,475,624
65-69	7,077	12,368	19,445	94,318,971 118,645,671 212,964,642
70-74	7,327	13,397	20,724	94,424,702 123,697,968 218,122,670
75-79	4,334	9,384	13,718	47,884,198 77,486,030 125,370,228
80-84	2,727	6,480	9,207	25,866,781 45,586,713 71,453,494
85-89	1,420	3,755	5,175	11,667,759 23,079,705 34,747,464
90 & Over	<u>704</u>	<u>2,666</u>	<u>3,370</u>	<u>5,343,644</u> <u>14,097,945</u> <u>19,441,589</u>
Total	27,614	53,967	81,581	\$ 339,875,591 \$ 465,022,357 \$ 804,897,948

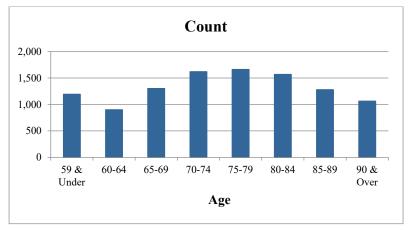


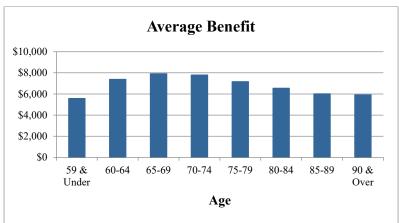




BENEFICIARIES RECEIVING BENEFITS As of June 30, 2020 for the June 30, 2021 Valuation

<u>-</u>	Count of Members			Annual Benefits			
<u>Age</u>	<u>Male</u>	<u>Female</u>	<u>Total</u>	Male <u>Female</u> <u>Total</u>			
59 & Under	332	861	1,193	\$ 1,602,716 \$ 5,050,316 \$ 6,653,032			
60-64	207	693	900	1,214,448 5,429,830 6,644,278			
65-69	299	1,004	1,303	2,081,103 8,224,744 10,305,847			
70-74	395	1,226	1,621	2,590,757 10,041,004 12,631,761			
75-79	372	1,291	1,663	2,102,197 9,807,318 11,909,515			
80-84	312	1,257	1,569	1,686,795 8,573,977 10,260,772			
85-89	232	1,048	1,280	1,036,876 6,656,703 7,693,579			
90 & Over	<u>101</u>	<u>963</u>	<u>1,064</u>	<u>435,095</u> <u>5,860,498</u> <u>6,295,593</u>			
Total	2,250	8,343	10,593	\$ 12,749,987 \$ 59,644,390 \$ 72,394,377			

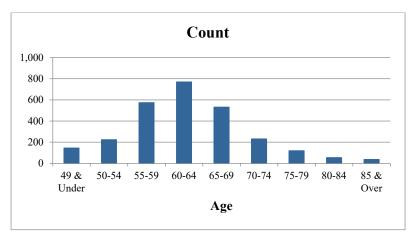


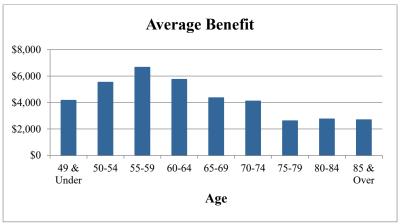




DISABLED MEMBERS As of June 30, 2020 for the June 30, 2021 Valuation

_	Cou	unt of Member	rs		Annual Benefits	3
<u>Age</u>	Male	<u>Female</u>	<u>Total</u>	Male	<u>Female</u>	<u>Total</u>
49 & Under	60	84	144	\$ 288,852	\$ 310,135	\$ 598,987
50-54	88	135	223	574,040	658,598	1,232,638
55-59	246	327	573	1,956,443	1,861,313	3,817,756
60-64	317	452	769	2,115,419	2,303,118	4,418,537
65-69	199	332	531	926,287	1,386,192	2,312,479
70-74	99	131	230	469,798	474,447	944,245
75-79	47	71	118	129,586	178,583	308,169
80-84	18	35	53	50,264	95,684	145,948
85 & Over	<u>10</u>	<u>26</u>	<u>36</u>	24,190	72,648	96,838
Total	1,084	1,593	2,677	\$ 6,534,879	\$ 7,340,718	\$ 13,875,597







ADDITIONAL IN PAY INFORMATION As of June 30, 2020 for the June 30, 2021 Valuation

Schedule of Average Benefit Payments ¹

	Years of Credited Service						
For the Year Ended June 30, 2021	< 10 ²	10 - 14	15 - 19	20 - 24	25 - 29	30 +	Total
Average Monthly Defined Benefit	\$155	\$302	\$423	\$591	\$828	\$1,330	\$672
Average Monthly DC Annuity ³	\$48	\$111	\$151	\$208	\$281	\$486	\$242
Average Final Average Salary ⁴	\$26,038	\$27,156	\$29,199	\$31,565	\$35,182	\$42,972	\$32,947
Number of Benefit Recipients	3,224	16,508	22,856	18,616	14,252	19,395	94,851

¹Calculated using the prior year census data, adjusted for certain activity during the fiscal year.

²Members with less than 10 years of service are: (1) a member receiving a disability benefit from INPRS; (2) a member who has at least eight years of creditable service as a county clerk, county auditor, county recorder, county treasurer, county sheriff or county coroner eligible for a normal retirement after reaching age 65 (applies to only members retiring after June 30, 2002); (3) a member who has at least eight years of creditable service as a state auditor, state treasurer, or secretary of state (whose term commences after the November 5, 2002 election).

³This represents those retirees who elected to receive their DC account as a supplemental monthly payment in addition to the monthly Defined Benefit payment.

⁴Excludes the 1,875 in-pay members who are missing a final average salary in the data.



ADDITIONAL IN PAY INFORMATION As of June 30, 2020 for the June 30, 2021 Valuation

Schedule of Benefit Recipients by Type of Benefit Option ¹

Number of Recipients by Benefit Option²

Amount of Monthly Benefit (in dollars)	5-Year Certain & Life ³	Straight Life	Joint with 100% Survivor Benefits	Joint with Two-Thirds Survivor Benefits	Joint with One-Half Survivor Benefits	Survivors	Disability	Total Benefit Recipients
1-500	11,382	9,788	7,933	913	2,004	6,196	1,917	40,133
501-1,000	7,517	9,798	5,569	1,140	2,374	2,929	545	29,872
1,001-1,500	2,792	4,518	3,202	724	1,287	967	158	13,648
1,501-2,000	1,132	2,125	1,396	448	594	311	50	6,056
2,001-2,500	466	1,038	699	194	341	115	4	2,857
2,501-3,000	221	426	293	99	150	45	1	1,235
Over 3,000	137	418	223	114	126	30	2	1,050
Total	23,647	28,111	19,315	3,632	6,876	10,593	2,677	94,851

¹ Calculated using the prior year census data, adjusted for certain activity during the fiscal year.

² Beginning October 2014, social security integration can apply to any optional form.

³ Includes members who elected a modified cash refund plus 5-year certain & life.



ADDITIONAL IN PAY INFORMATION As of June 30, 2020 for the June 30, 2021 Valuation

Schedule of Retirees and Beneficiaries 1

	Added	to Rolls	Removed	from Rolls	Rolls - End of Year				
	Number	Annual Benefits ²	Number	Annual Benefits ²	Number	Total Annual Benefits ²	Percent Change In Total Annual Benefits	Average Annual Benefit	Percent Change In Average Annual Benefit
2021 ³	5,502	\$55,399	3,087	\$21,538	94,851	\$891,168	3.7%	\$9,395	1.0%
2020 ³	5,194	50,481	2,690	18,520	92,436	859,427	3.7	9,298	0.9
2019 ³	5,077	50,319	3,135	21,565	89,932	829,035	3.4	9,218	1.2
2018^{3}	5,249	55,236	2,389	15,609	87,990	801,551	5.8	9,110	2.3
2017^{3}	4,855	49,980	2,913	18,808	85,130	757,851	3.9	8,902	1.5
2016^{3}	6,478	78,487	2,488	15,597	83,188	729,366	9.9	8,768	4.6
2015 3	5,489	60,538	2,241	14,107	79,198	663,767	7.4	8,381	3.0
2014 3	0	0	0	0	75,950	617,977	0.0	8,137	0.0
2013	5,231	55,523	2,273	13,898	75,950	617,977	7.2	8,137	3.0
2012	4,751	49,766	2,139	12,540	72,992	576,678	6.8	7,901	3.0

¹Dollar amounts are in thousands except for the average annual benefit.

² Annual benefits includes members selecting an annuity for their DC account. End of year annual benefits are not equal to prior end of year annual benefits plus additions less removals due to beneficiary benefit changes, data changes, and COLA increases.

³The valuation results were calculated using the prior year census data, adjusted for certain activity during the fiscal year.





Definitions

Fiscal year Twelve month period ending June 30.

Participation All full time employees of the State of Indiana and all full

time employees of Political Subdivisions which have adopted

the plan become members of PERF upon date of hire.

Average monthly earnings The monthly average of earnings during 20 quarters (in

groups of 4 consecutive contribution quarters) preceding retirement that produce the highest such average. Earnings include basic salary, the member's 3% mandatory contribution paid by the employer, the member's salary reduction agreement under Section 125, 430(b), or 457 of the Internal Revenue Code, and up to \$2,000 of additional compensation received from the employer in anticipation of

the member's termination or retirement.

Member contributions Each member is required to contribute to a Defined

Contribution Account at the rate of 3% of pay (unless the employer has opted to make the contribution for the employee). These contributions are kept on deposit and credited with interest based on the investment elections of each member until such time as they are withdrawn or

annuitized by the member.

The Defined Contribution Account benefit is in addition to the annuity benefits provided by employer contributions. During FYE 2018, the Defined Contribution Accounts were completely separated from the defined benefit plan, and so

are no longer relevant to the valuation process.

Minimum pension benefit The minimum pension benefit paid to a member with 10 or

more years of creditable service receiving any pension benefit

is \$180 per month.

Eligibility for Benefits

Deferred vested 10 or more years of vesting service and no longer active.

Disability retirement 5 or more years of vesting service and qualified for Social

Security disability benefits or federal Civil Service disability

benefits.

Early retirement Age 50 with 15 or more years of vesting service.





Normal retirement

Earliest of:

- Age 65 with 10 or more years of vesting service
- Age 60 with 15 or more years of vesting service
- Age 55 with sum of age and vesting service equal to 85 or more.

Pre-retirement death

10 or more years of vesting service.

Monthly Benefits Payable

Normal retirement

The normal retirement benefit is a pension payable for life with 60 months guaranteed and is equal to 1.1% of average monthly earnings multiplied by years of creditable service earned. The minimum monthly benefit is \$180 if the member has at least 10 years of creditable service.

Early retirement

The early retirement benefit is the accrued retirement benefit determined as of the early retirement date and payable commencing at the normal retirement date. A member may elect to have the benefit commence prior to normal retirement provided the benefit is reduced by 1/10% for each of the first 60 months and by 5/12% for each of the next 120 months that the benefit commencement date precedes the normal retirement date. The minimum monthly benefit is \$180 if the member has at least 10 years of creditable service.

Deferred retirement

The termination benefit is the accrued retirement benefit determined as of the termination date and payable commencing at age 65. If the member has 15 or more years of creditable service, then the member may elect to receive a reduced early retirement benefit prior to age 65. The minimum monthly benefit is \$180 if the member has at least 10 years of creditable service.

Disability

The disability retirement benefit is the accrued retirement benefit determined as of the disability date and payable commencing the month following disability date without reduction for early commencement. The minimum monthly benefit is \$180.

Pre-retirement death

The spouse or dependent beneficiary is entitled to receive the monthly life benefit payable immediately under the assumption that the member retired on the later of age 50 or the date before the date of death and elected the joint and full survivor option. The minimum monthly benefit is \$180 if the member has at least 10 years of creditable service.



Cost-of-Living-Adjustments

The employer-funded monthly pension benefits for members in pay status are increased periodically to preserve purchasing power that is diminished due to inflation. Such increases are not guaranteed by Statute and will only be provided by legislative action.

A "13th check" was paid to each member in pay status during fiscal year 2018, 2019, 2020 and 2021. The amount of the 13th check varied based on the years of creditable service the member had earned prior to retirement.

Legislation passed in the 2018 legislative session creates a funding mechanism to provide for future benefit increases or 13th checks. The INPRS Board has the authority to have employers contribute up to 1% of member pay into the fund.

Increases or payments are made upon passed legislation subject to the availability of funds to provide the benefit. Legislation passed in 2021 provided for a 1% increase effective January 1, 2022 and no increase through the remainder of the biennium.

Forms of payment

a. 5-Year Guaranteed BeneficiaryBenefit (Option 10)

Member will receive a monthly benefit for the rest of their life. If the member dies before receiving benefits for 5 years, the beneficiary will receive that monthly benefit for the remainder of those 5 years or a lump sum distribution equal to the present value of those payments. After 5 years, there are no payments available to the beneficiary.

b. Benefit with No Guarantee (Option 20)

Member will receive a monthly benefit for life, but there are no monthly payments to anyone after death. However, the balance of the Defined Contribution Account will be distributed to the beneficiary or estate if it is larger than the payments previously made to the member.

c. Joint with Full Survivor Benefits (Option 30)

Member will be paid a monthly benefit for life. After death, the same monthly benefit will be paid to the beneficiary for their lifetime.

d. Joint with Two-Thirds Survivor Benefits (Option 40)

Member will be paid a monthly benefit for life. After death, two-thirds (2/3) of the benefit will be paid to the beneficiary for their lifetime.



e. Joint with One-Half Survivor Benefits (Option 50)

Member will be paid a monthly benefit for life. After death, one-half (1/2) of the benefit will be paid to the beneficiary for their lifetime.

f. Integration with Social Security (Option 61)

A member who retires between ages 50 and 62 may integrate the PERF monthly pension benefit with the member's estimated Social Security benefits. This does not affect the amount of the benefit received from the Social Security Administration.

Before age 62, the member's benefits will equal the sum of the member's Social Security estimate, multiplied by actuarial factors, and the member's early retirement benefit. This will result in the member receiving a larger monthly benefit payment before age 62. After age 62, the member's benefit will equal the difference between the member's Social Security estimate, multiplied by actuarial factors, and the member's pre-62 monthly pension benefit. Depending upon the member's estimated Social Security disbursement, benefit payments may be greatly reduced or terminated at age 62.

g. 5-Year Guaranteed BeneficiaryBenefit with Cash Refund (Option 71)

In order to select this option, the member must choose to combine at least a portion of their Defined Contribution Account with their lifetime monthly pension benefit. If selected, the member will receive a monthly benefit for the rest of their life. If the member dies before receiving payments for 5 years, the beneficiary will receive the pension portion of their monthly benefit for the remainder of those 5 years or a lump sum equal to the present value of those remaining payments. Also, upon death (whether death occurs before or after receiving 5 years of benefits), the beneficiary may receive any remaining balance of the Defined Contribution Account.

Changes in Plan Provisions since the Prior Year

House Enrolled Act No. 1001 was passed in April 2021 and granted a 1.00% cost-of-living adjustment effective January 1, 2022 to be paid from the Supplemental Reserve Account. No supplemental benefits were granted for fiscal year 2023.



ACTUARIAL METHODS

1. Actuarial Cost Method

The actuarial cost method is Entry Age Normal - Level Percent of Payroll.

The normal cost is calculated separately for each active member and is equal to the level percentage of payroll needed as an annual contribution from entry age to retirement age to fund projected benefits. The actuarial accrued liability on any valuation date is the accumulated value of such normal costs from entry age to the valuation date.

For funding, gains and losses occurring from census experience different than assumed, assumption changes, and benefit changes are amortized over a 20-year period with level payments each year. A new gain or loss base is established each year based on the additional gain or loss during that year and that base is amortized over a new 20-year period (gain or loss bases established prior to June 30, 2016 were amortized over 30 years and will continue to be amortized over 30 -year period). However, when the plan is at or above 100% funded (based on Actuarial Value of Assets), the past amortization bases are considered fully amortized and a single amortization base equal to the surplus is amortized over a 30-year period with level payments each year. Effective June 30, 2018, the bases are calculated without regards to the COLA provisions. The purpose of the method is to give a smooth progression of the costs from year to year and, at the same time, provide for an orderly funding of the unfunded liabilities.

For accounting, gains and losses occurring from census experience different than assumed and assumption changes are amortized into expense over the average expected future service of all plan participants. Gains and losses occurring from investment experience different than assumed are amortized into expense over a 5-year period. The effect of plan changes on the plan liability are fully recognized in expense in the year in which they occur.

Member census data as of June 30, 2020 was used in the valuation and adjusted, where appropriate, to reflect changes between June 30,2020 and June 30, 2021. The valuation results from June 30, 2020 were rolled-forward to June 30, 2021 to reflect benefit accruals during the year less benefits paid.

2. COLA Surcharge

The COLA Surcharge is developed by determining the assets needed at the start of the next biennium to fund the post-retirement benefit increases anticipated to be granted in that biennium. This amount is divided by the present value of expected payroll over which the accumulations will occur.

3. Asset Valuation Method

Actuarial Value of Assets is equal to a five-year smoothing of gains and losses on the Market Value of Assets subject to a 20% corridor.



4. Anticipated Payroll

The Anticipated Payroll for the fiscal year beginning July 1, 2021 is equal to the actual payroll during the year ending June 30, 2021, increased with one year of salary scale.

5. Employer Contribution Rates

Based on the assumptions and methods previously described, an actuarially determined contribution rate is computed. The Board considers this information and has ultimate authority in setting the employer contribution rates.

Changes in Methods since the Prior Year

None.



ACTUARIAL ASSUMPTIONS

Valuation Date June 30, 2021

Economic Assumptions

1. Investment return 6.25% per year, compounded annually (net of administrative

and investment expenses)

2. Inflation 2.00% per year

3. Salary increase

Service	Wage Inflation	Merit	Salary Increase
0	2.65%	6.00%	8.65%
1	2.65%	5.00%	7.65%
2	2.65%	4.00%	6.65%
3	2.65%	3.00%	5.65%
4	2.65%	2.50%	5.15%
5	2.65%	2.00%	4.65%
6	2.65%	1.75%	4.40%
7	2.65%	1.50%	4.15%
8	2.65%	1.25%	3.90%
9	2.65%	1.00%	3.65%
10	2.65%	0.75%	3.40%
11	2.65%	0.50%	3.15%
12	2.65%	0.25%	2.90%
13+	2.65%	0.00%	2.65%

4. Cost-of-Living Adjustment (COLA)

Members in pay were granted a 1.00% COLA effective January 1, 2022 for the next biennium. Thereafter, the following COLAs, compounded annually, were assumed:

0.4% beginning on January 1, 2024

0.5% beginning on January 1, 2034

0.6% beginning on January 1, 2039



Demographic Assumptions

1. Mortality

Pub-2010 Public Retirement Plans Mortality Tables (Amount-Weighted) with a fully generational projection of mortality improvements using SOA Scale MP-2019.

Healthy Employees – General Employee table with a 3 year set forward for males and a 1 year set forward for females.

Retirees – General Retiree table with a 3 year set forward for males and a 1 year set forward for females.

Beneficiaries – Contingent Survivor table with no set forward for males and a 2 year set forward for females.

Disableds – General Disabled table with a 140% load.

2. Disability

	Sample Rates					
Age	Male	Female				
20	0.004%	0.003%				
25	0.008%	0.006%				
30	0.014%	0.010%				
35	0.024%	0.018%				
40	0.042%	0.032%				
45	0.080%	0.061%				
50	0.160%	0.124%				
55+	0.300%	0.200%				

3. Retirement

Age	Eligible for Reduced Benefit	Eligible for Unreduced Benefit
50-54	4%	N/A
55	5%	14%
56-59	5%	10%
60	N/A	12%
61	N/A	16%
62	N/A	22%
63	N/A	19%
64	N/A	24%
65-74	N/A	30%
75+	N/A	100%

Active members: 30% commence benefit immediately (reduced for early retirement, if applicable). 70% defer to earliest unreduced retirement date.

Inactive vested members are assumed to commence their retirement benefit at their earliest normal retirement date.



4. Termination

	State	PSD, Salary >\$20K
Service	Unisex	Unisex
0	24.00%	18.00%
1	20.00%	16.00%
2	18.00%	14.00%
3	16.00%	12.00%
4	14.00%	10.00%
5	12.00%	8.00%
6	11.00%	7.50%
7	10.00%	7.00%
8	9.00%	6.50%
9	8.00%	6.50%
10	7.00%	6.50%
11	6.50%	6.25%
12	6.00%	6.00%
13	5.75%	5.75%
14	5.50%	5.50%
15	5.25%	5.25%
16	5.00%	5.00%
17	4.75%	4.75%
18	4.50%	4.50%
19	4.25%	4.25%
20	4.00%	4.00%
21	4.00%	3.75%
22	4.00%	3.50%
23	4.00%	3.25%
24	4.00%	3.00%
25	4.00%	3.00%
26	4.00%	3.00%
27+	1.00%	3.00%

PSD, Salary <\$20k			
Age	Male	Female	
15-22	34.00%	40.00%	
23	34.00%	38.00%	
24	34.00%	36.00%	
25	34.00%	34.00%	
26	34.00%	32.00%	
27	34.00%	30.00%	
28	34.00%	29.00%	
29	34.00%	28.00%	
30	29.00%	27.00%	
31	29.00%	26.00%	
32	29.00%	25.00%	
33	29.00%	24.00%	
34	29.00%	23.00%	
35	25.00%	22.00%	
36	25.00%	21.00%	
37	25.00%	20.00%	
38	25.00%	19.00%	
39	25.00%	18.00%	
40	24.00%	17.00%	
41	24.00%	16.00%	
42	24.00%	15.00%	
43	24.00%	14.00%	
44	24.00%	13.00%	
45-49	21.00%	12.00%	
50-60	17.00%	12.00%	
61+	14.00%	12.00%	



APPENDIX C - SUMMARY OF ACTUARIAL METHODS AND ASSUMPTIONS

Other Assumptions

1. Form of payment 100% of members are assumed to elect the normal form of

benefit payment, a single life annuity with a five-year certain

period.

2. Marital status

a. Percent married 80% of male members and 65% of female members are

assumed to be married and or to have a dependent

beneficiary.

b. Spouse's age Male members are assumed to be three (3) years older than

their spouses and female members are assumed to be two (2)

years younger than their spouses.

3. Decrement timing Decrements are assumed to occur at the beginning of the year.

4. Miscellaneous adjustments For active members, the Average Annual Compensation was

increased by \$200 for additional wages received upon

termination, such as severance or unused sick leave.

Changes in Assumptions since the Prior Year

As a result of the Asset-Liability work completed and discussed at the May 7, 2021 Board meeting, the Board made portfolio revisions and adopted a new set of economic assumptions for the June 30, 2021 actuarial valuations as follows:

- The investment return assumption was lowered from 6.75% (as of June 30, 2020) to 6.25%.
- Price inflation was lowered from 2.25% (as of June 30, 2020) to 2.00%.
- General wage inflation was lowered from 2.75% (as of June 30, 2020) to 2.65%.

Legislation granted a 1.00% cost-of-living adjustment effective January 1, 2022 to be paid from the Supplemental Reserve Account. No supplemental benefits were granted for fiscal year 2023. This replaces the COLA assumption of 0.4% for Fiscal Years 2022 and 2023 but does not change the assumption for future years.



Data Adjustments

Active and retired member data is reported as of June 30. Member census data as of June 30, 2020 was used in the valuation and adjusted, where appropriate, to reflect changes between June 30, 2020 and June 30, 2021. Standard actuarial roll-forward techniques were then used to project the liability computed as of June 30, 2020 to the June 30, 2021 measurement date. The normal cost rate is assumed to remain unchanged between June 30, 2020 and June 30, 2021.

The member payroll and asset information for this valuation were furnished as of June 30, 2021. Projected FYE 2022 payroll is assumed to increase by the salary growth assumption over the total payroll observed for FYE 2021. We did not audit the information provided, but we did review it thoroughly for reasonableness and compared it with the prior year's submission for consistency.

Actives and inactives with no date of birth are assumed to be the average age of the member population with their respective status. Additionally, payroll for new hires is annualized, and actives missing a salary are assumed to earn the average active salary amount.

Other Technical Valuation Procedures

Salary increases are assumed to apply to annual amounts.

Decrements are assumed to occur at the beginning of the year. Standard adjustments are made for multiple decrements.

No actuarial liability is included for participants who terminated without being vested prior to the valuation date.





Accrued Service Service credited under the plan that was rendered before the

date of the actuarial valuation.

Actuarial Assumptions Estimates of future experience with respect to demographic or

economic events. Demographic assumptions (rates of mortality, disability, turnover and retirement) are generally based on past experience, often modified for projected changes in conditions. Economic assumptions (salary increases and investment income) consist of an underlying rate in an inflation-free environment plus a provision for a long-term

average rate of inflation.

Actuarial Cost Method A mathematical budgeting procedure for allocating the dollar

amount of the actuarial present value of retirement plan benefits between future normal cost and actuarial accrued liability. Sometimes referred to as the "actuarial funding

method."

Actuarial Equivalent A single amount or series of amounts of equal value to another

single amount or series of amounts computed on the basis of a

given set of actuarial assumptions.

Actuarial Accrued Liability The difference between the actuarial present value of plan

benefits and the actuarial value of future normal costs. Also

referred to as "accrued liability" or "actuarial liability."

Actuarial Present Value The amount of funds currently required to provide a payment

or series of payments in the future. It is determined by discounting future payments at predetermined rates of interest

and by probabilities of payment.

Amortization Paying off an interest-discounted amount with periodic

payments of interest and principal, as opposed to paying off

with lump sum payment.

Experience Gain (Loss) The difference between actual experience and actuarial

assumptions anticipated experience during the period between

two actuarial valuation dates.

Normal Cost The actuarial present value of retirement plan benefits

allocated to the current year by the actuarial cost method.

Unfunded Actuarial Accrued Liability The difference between actuarial liability and the actuarial

value of assets. Sometimes referred to as "unfunded accrued

liability" or "unfunded liability".

Most retirement plans have unfunded actuarial liability. They arise anytime new benefits are added and anytime an actuarial

loss is realized.